## **Listing of the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application.

Our File: 42871-0020

- 1-14. (cancelled)
- 15. (previously amended) A network comprising:
  - a backbone;

at least two provider edge devices connected to and working with said backbone; and

layer-1 VPN information and layer-2 VPN information processed by one of said at least two provider edge devices;

a layer-2 provider edge device attached to said one of said at least two provider edge devices, said layer-2 provider edge device configured to advertise said layer-2 VPN information to said one of said at least two provider edge devices.

wherein said one of said at least two provider edge devices is configured to use a discovery mechanism for distributing said layer-2 VPN information.

- 16. (original) A network as claimed in claim 15 wherein said at least two provider edge devices are GVPN-based.
- 17. (original) A network as claimed in claim 16 wherein said at least two provider edge devices are a part of a network of a first service provider.
- 18. (original) A network as claimed in claim 17 further comprising a second service provider having its own network, said second service provider being a customer of said first service provider.

- 19. (previously amended) A network as claimed in claim 18 wherein both layer-1 VPN auto-discovery and layer-2 VPN auto-discovery are carried out within said network of the first service provider.
- 20. (original) A network as claimed in claim 15 wherein said backbone includes a portion of the Internet.